Support for the wording of the claims 16, 17, and 21 as amended may be found at page 12, line 27, to page 13, line 2, of the specification (second to last paragraph under the heading "Preparation of Foams").

Patentability over the cited references

I. Chaudhary *et al.* '232 and '120

The Examiner rejects claims 9 to 15 under 35 U.S.C. 102(a) as anticipated by or, in the alternative under 35 U.S.C. 103(a) as obvious over Chaudhary *et al.* '232 (USP 6,187,232) or Chaudhary *et al.* '120 (USP 6,369,120), which is a divisional of Chaudhary *et al.* '232. Applicants respectfully traverse.

According to MPEP §2126, a secret patent is not available as a reference under 35 U.S.C. §102(a) until it is available to the public and according to MPEP §2132 the statutory language "known or used by others in this country" in 35 U.S.C. §102(a) means knowledge or use which is accessible to the public. Both Chaudhary *et al.* patents are granted and published after the March 17, 2000, effective filing date of this application under 35 U.S.C. §119(e). Thus, both are apparently not available as prior art under this statutory provision.

Chaudhary et al. may be available under 35 U.S.C. §102(e) for the purpose of novelty only if the invention was described before the same was already invented by applicant(s). Since both have CIPs in their lineage, the critical date for that determination may be January 19, 2000, or December 4, 1998, depending on the feature in question. Applicants reserve the right to overcome this reference with a 37 CFR 1.131 declaration if necessary or appropriate.

II. Collins

The Examiner rejects Claims 9 to 15 as anticipated by, or obvious over, Collins (USP 4,323,528) in view of Applicants' own teachings at page 7, line 25, to page 8, line 11. Applicants respectfully traverse.

The referenced passage provides a citation to describe what is meant by the term "accumulating extrusion process". The text which follows describes how that prior art process may be modified to make foam according to the present invention. There is not the slightest hint that the text after the first sentence is disclosed by Collins.

On the contrary, applicants state in the present tense that low density foam structures "are prepared by . . . ". If this description were intended to convey information regarding what is taught by the cited prior art, the past tense would have been more appropriate. Selection of the present tense clearly shows an intent to describe their invention and not the prior art.

That item 6) (wherein the die pressure for extrusion "can only go as high as four times, preferably three times, even more preferably two times, the prefoaming critical die pressure") is not admitted to be prior art is made clear by applicants' statement at page 5, lines 15-19, of applicant's copy of the application (paragraph beginning with, "However, what is critical to the process of the present invention . . . ") and described in detail thereafter.

Therefore, Collins may not be relied upon to disclose anything more than how one carries out the accumulating extrusion process. The feature critical to obtaining the desired effect of this invention is not taught by this reference. Nor does Collins teach how to make macrocellular foams containing halogenated flame retardant according to claim 1 or 9.

Therefore, the present invention is novel and inventive over Collins.

Information Disclosure Statements

On December 11, 2002, Applicants submitted an information disclosure statement with a Form PTO-1449 and the cited references. Applicants respectfully request acknowledgement that those references have been considered.

Applicant further requests Examiner to consider the references submitted with a new information disclosure statement mailed on even date with this response.

USSN 09/782,499

In the event that any minor issues remain, Applicant invites the Examiner to call the undersigned to discuss the same. The undersigned will respond promptly to any further requirements.

Respectfully submitted,

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60602A

We claim:

1. (Once Amended) A ~~process for preparing a~~ macrocellular acoustic foam obtainable by ~~from a polymeric resin composition, said process comprising~~ subjecting a foamable gel comprising at least one blowing agent and at least one polymeric resin composition to an extrusion process, wherein said polymeric resin composition comprises

   A) one or more homopolymers of ethylene, one or more C_3-C_{20} α–olefin polymer, or a combination thereof;

   B) one or more halogenated flame retardants;

   C) optionally, one or more polymers other than that of Component A; and

   D) optionally, one or more flame retardant synergists,

   wherein the extrusion process is conducted at a die pressure greater than the prefoaming critical die pressure but less than or equal to four times that of said prefoaming critical die pressure.

~~Claims 2 to 8 are cancelled.~~

9. (Once Amended) A macrocellular acoustic foam comprising;

   A) one or more homopolymers of ethylene, one or more C_3-C_{20} α–olefin polymers, or a combination thereof;

   B) one or more halogenated flame retardants;

   C) optionally, one or more polymers other than that of Component A; and

   D) optionally, one or more flame retardant synergists.

10. (~~Once~~Twice Amended) The macrocellular acoustic foam of Claim 9; wherein

   A) Component A is one or more homopolymers of ethylene, or one or more C_3-C_{10} α-olefin polymers, or a combination thereof;

B) said halogenated flame retardant, Component B comprises one or more of hexahalodiphenyl ethers, octahalodiphenyl ethers, decahalodiphenyl ethers, decahalobiphenyl ethanes, 1,2-bis(trihalophenoxy) ethanes, 1,2-bis(pentahalophenoxy) ethanes, hexahalocyclododecane, a tetrahalobisphenol-A, ethylene(N, N')-bis-tetrahalophthalimides, tetrabromobisphenol A bis (2,3-dibromopropyl ether), tetrahalophthalic anhydrides, hexahalobenzenes, halogenated indanes, halogenated phosphate esters, halogenated paraffins, halogenated polystyrenes, polymers of halogenated bisphenol-A and epichlorohydrin, or a combination thereof;

C) Component C, ~~is~~when present, ~~and~~ comprises one or more of; ~~a substantially random interpolymer, a~~ heterogeneous ~~ethylene/α-olefin~~ interpolymer, a homogeneous ethylene/α-olefin interpolymer, a thermoplastic olefin, a styrenic block copolymer, a styrenic homopolymer or copolymer, an elastomer, a thermoplastic polymer, a thermoset polymer; a vinyl or vinylidene halide homopolymer or copolymer, an engineering thermoplastics, or a combination thereof; and

D) Component D is present and comprises one or more metal oxides, boron compounds, and organic peroxide compounds, or a combination thereof.

11. (~~Once~~Twice Amended) The macrocellular acoustic foam of Claim 9; wherein

A) Component A is a homopolymer of ethylene, or a propylene polymer, or a combination thereof;

B) said halogenated flame retardant, Component B comprises hexabromocyclododecane (HBCD), tetrabromobisphenol A bis (2,3-dibromopropyl ether), or a combination thereof;

C) Component C, when ~~is~~ present, ~~and~~ comprises ~~a substantially random interpolymer, a~~ heterogeneous ethylene/α-olefin interpolymer, a homogeneous ethylene/α-olefin interpolymer, or a combination thereof; and

D) said flame retardant synergist, Component D, is present and comprises one or more iron oxide, tin oxide, zinc oxide, aluminum trioxide, alumina, antimony trioxide, antimony pentoxide, bismuth oxide, molybdenum trioxide, and tungsten trioxide, zinc borate, antimony silicates, zinc stannate, zinc hydroxystannate, ferrocene, dicumyl peroxide, and polycumyl peroxide, or a combination thereof.

12. (~~Once~~Twice Amended) The macrocellular acoustic foam of Claim 11; wherein

A) Component A is LDPE or polypropylene, or a combination thereof;

B) Component B is hexabromocyclododecane (HBCD), tetrabromobisphenol A bis (2,3-dibromopropyl ether), or a combination thereof;

C) Component C, when ~~is~~ present, ~~as a substantially random ethylene/styrene interpolymer,~~is a substantially linear ethylene/1-octene copolymer~~; or a combination thereof~~; and

D) Component D is present as antimony trioxide.

13. (Cancelled) ~~A macrocellular acoustic foam obtainable by the process according to claim 1.~~

14. (Once Amended) The macrocellular acoustic foam of claim 9 having a halogen content in the range from 0.1 to 15 weight-percent~~an average cell size according to ASTM D3576 in the range from 3 mm to 10 mm~~.

15. The macrocellular acoustic foam of Claim 9 in the form of an office partition, automotive decoupler, domestic appliance sound insulation, sound proofing panel or machine enclosure.

16. ~~(New)~~ (Once Amended) The macrocellular acoustic foam of claim 9 having an average cell size according to ASTM D3576 in the range from 3 mm to ~~10~~15 mm.

60602A

17. ~~New)~~ (Once Amended) The macrocellular acoustic foam of claim 9 having an average cell size according to ASTM D3576 in the range from 4 mm to ~~8~~15 mm.

18. ~~(New)~~ The macrocellular acoustic foam of claim 9, wherein Component A is a homopolymer of ethylene, or a propylene polymer, or a combination thereof.

19. ~~(New)~~ The macrocellular acoustic foam of claim 9, wherein Component A comprises a propylene polymer.

20. ~~(New)~~ The macrocellular acoustic foam of claim 19, wherein the propylene polymer has a tan δ not greater than 1.5.

21. ~~(New)~~ (Once Amended) The macrocellular acoustic foam of claim 19 having an average cell size according to ASTM D3576 in the range from 4 mm to ~~8~~15 mm.

22. (~~New~~Once Amended) The macrocellular acoustic foam of claim 21 having a halogen content in the range from 0.1 to 15 weight-percent~~9, wherein when component C is present, component A is the majority component~~.

23. ~~(New)~~ The macrocellular acoustic foam of claim 9, wherein component C is present and the polymer blend component having the highest melting point is present in an amount greater than 40 weight-percent in the blend.